

IN THE CLAIMS

Please amend the claims as follows:

1. (Currently Amended) ~~In a controllee electronic apparatus, a method of operation~~

A method comprising:

~~providing to a remote control, by a controllee electronic apparatus, with a first collection of user interface displays having associated control commands, for the remote control to controlling the controllee electronic apparatus;~~

~~receiving by the controllee electronic apparatus, first control commands, from said remote control, the first control commands being resulteding from said provided first collection of user interface displays being used by a user of said remote control; and~~

~~controlling operation of said controllee electronic apparatus, by said controllee electronic apparatus. in accordance with said received first control commands.~~

2. (Currently Amended) The method of claim 1, wherein said providing to a remote control, ~~by a controllee electronic apparatus, with a first collection of user interface displays for controlling the controllee electronic apparatus~~ comprises providing to the remote control, ~~by said controllee electronic apparatus, with a first collection of user interface displays having a plurality of display states and associated display state transition rules.~~

3. (Currently Amended) The method of claim 1, wherein said providing to a remote control, ~~by a controllee electronic apparatus, with a first collection of user interface displays for controlling the controllee electronic apparatus~~ comprises providing to the remote control, ~~by the controllee electronic apparatus, with a first collection of user interface displays having a plurality of display cells.~~

4. (Cancelled)

5. (Cancelled)

6. (Cancelled)

7. (Cancelled)

8. (Cancelled)

9. (Currently Amended) The method of claim 1, wherein said first control commands comprise control commands for controlling a plurality of operation characteristics of said controllee electronic apparatus, and said plurality of operation characteristics ~~comprise~~are selected from a group consisting of power on/off, channel selections, audio volume, picture brightness, and picture color.

10. (Currently Amended) The method of claim 1, wherein said method further comprises providing to said remote control, by the controllee electronic apparatus, with a second collection of user interface displays for controlling an auxiliary controllee electronic device coupled to said controllee electronic apparatus.

11. (Currently Amended) The method of claim 10, wherein said providing to the remote control, by the controllee electronic apparatus, with a second collection of user interface displays for controlling the auxiliary controllee electronic device, comprises providing to the remote control, by the controllee electronic apparatus, with a second collection of user interface displays having a plurality of display states and associated display state transition rules.

12. (Currently Amended) The method of claim 10, wherein said providing to the remote control, by the controllee electronic apparatus, with a second collection of user interface displays for controlling the auxiliary controllee electronic device, comprises providing to the remote control, by the controllee apparatus, with a second collection of user interface displays having a plurality of display cells.

13. (Cancelled) ~~with with one~~

14. (Currently Amended) The method of claim 10, wherein said method further comprises

receiving by the controllee electronic apparatus, from said auxiliary controllee electronic device, specifications of the substantive contents of said second collection of user interface displays; and

generating by the controllee electronic apparatus, said second collection of user interface displays, in accordance with said received specifications.

15. (Currently Amended) The method of claim 14, wherein said receiving of specifications of the substantive contents of said second collection of user interface displays, by said controllee electronic apparatus, comprises receiving by the controllee electronic apparatus, from said auxiliary controllee electronic device, an XML based specification.

16. (Cancelled)

17. (Cancelled)

18. (Currently Amended) The method of claim 10, wherein said method further comprises

receiving by the controllee electronic apparatus, second control commands, from said remote control, the second control commands being resulteding from said provided second collection of user interface displays being used by asaid user of said remote control; and

controlling operation of said auxiliary controllee electronic device, by said controllee electronic apparatus, in accordance with said received second control commands.

19. (Cancelled)

20. (Currently Amended) The method of claim 18, wherein said controlling of the operation of the auxiliary contollee electronic device, by the contollee electronic apparatus, comprises relaying by the contollee electronic apparatus, the received second commands, to the auxiliary contollee electronic device.

21. (Cancelled)

22. (Cancelled)

23. (Currently Amended) The method of claim 202, wherein said second control commands comprise control commands for controlling a plurality of operation characteristics of said auxiliary contollee electronic device, and said plurality of operation characteristics ~~comprise~~ are selected from a group consisting of power on/off, play, fast forward, reverse, pause, stop, audio volume, picture brightness, and picture color.

24. (Cancelled)

25. (Cancelled)

26. (Currently Amended) ~~In a auxiliary contollee electronic device coupled to a primary contollee electronic device, a~~ A method of operation comprising:
providing to a primary contollee electronic device, by an auxiliary contollee electronic device, specifications for a collection of user interface displays having associated control commands for controlling the auxiliary contollee electronic device, ~~to the primary contollee electronic device~~ for the primary contollee electronic device to generate and provide the collection of user interface displays ~~to a remote control having associated control commands to a remote control;~~

~~receiving by the auxiliary contollee electronic device, control commands, originated from said remote control, the control commands being resulteding from said~~

provided collection of user interface displays having associated control commands being used by a user of said remote control; and

controlling operation of said auxiliary contollee electronic device, by said auxiliary contollee electronic device, in accordance with said received control commands.

27. (Currently Amended) The method of claim 26, wherein said providing to a primary contollee electronic device, by an auxiliary contollee electronic device, of specifications for a collection of user interface displays having associated control commands for controlling the auxiliary contollee electronic device, comprises providing to the primary contollee electronic device, by the auxiliary contollee electronic device, specifications for a collection of user interface displays having a plurality of display states and associated display state transition rules.

28. (Currently Amended) The method of claim 26, wherein said providing to a primary contollee electronic device, by an auxiliary contollee electronic device, of specifications for a collection of user interface displays having associated control commands, for controlling the auxiliary contollee electronic device, comprises providing specifications for a collection of user interface displays having a plurality of display cells.

29. (Currently Amended) The method of claim 26, wherein said providing to a primary contollee electronic device, by an auxiliary contollee electronic device, of specifications for a collection of user interface displays having associated control commands for controlling the auxiliary contollee electronic device, comprises providing to the primary contollee electronic device, by the auxiliary contollee electronic device, an XML based specification, specifying the substantive contents of the collection of user interface displays.

30. (Cancelled)

31. (Cancelled)

32. (Cancelled)

33. (Cancelled)

34. (Cancelled)

35. (Currently Amended) The method of claim 34, wherein said control commands comprise control commands for controlling a plurality of operation characteristics of said auxiliary controlllee electronic device, and said plurality of operation characteristics ~~comprise~~ are selected ~~a group consisting of~~ power on/off, play, fast forward, reverse, pause, stop, audio volume, picture brightness, and picture color.

36. (Cancelled)

37. (Cancelled)

38. (Currently Amended) ~~In a remote control, a~~ A method of operation comprising: receiving by a remote control, from a primary controlllee electronic device, a first collection of user interface displays having associated control commands for controlling ~~a~~the primary controlllee electronic device;

facilitating usage of the first collection of user interface displays by a user, by the remote control, to control the primary controlllee electronic device; and

providing first control commands to the primary controlllee electronic device, by the remote control, to control the primary controlllee electronic device, in response to said usage of the first collection of user interface displays.

39. (Currently Amended) The method of claim 38, wherein said receiving of a first collection of user interface displays having associated control commands for controlling the primary controlllee electronic device, by the remote control, comprises receiving by the remote control, from the primary controlllee electronic device, a first collection of

user interface displays having a plurality of display states and associated display state transition rules.

40. (Currently Amended) The method of claim 38, wherein said receiving of a first collection of user interface displays having associated control commands for controlling the primary controllee electronic device, by the remote control, from the primary controllee electronic device, comprises receiving by the remote control, from the primary controllee electronic device, a first collection of user interface displays having a plurality of display cells.

41. (Cancelled)

42. (Cancelled)

43. (Currently Amended) The method of claim 38, wherein said first control commands comprise control commands for controlling a plurality of operation characteristics of said primary controllee electronic device, and said plurality of operation characteristics comprise-are selected ones-the group consisting of power on/off, channel selections, audio volume, picture brightness, and picture color.

44. (Currently Amended) The method of claim 38, wherein the method further comprises

receiving by the remote control, a second collection of user interface displays having associated control commands, from the primary controllee electronic device, for controlling an auxiliary controllee electronic device coupled to the primary controllee electronic device;

facilitating usage of the second collection of user interface displays by a user, by the remote control, to remotely control the auxiliary controllee electronic device; and

providing second control commands either directly or indirectly to the auxiliary controllee electronic device, by the remote control, to control the auxiliary controllee

electronic device, in response to said usage of the second collection of user interface displays.

45. (Currently Amended) The method of claim 44, wherein said providing~~receiving~~
by the remote control, from a primary controlllee electronic device, of a second collection of user interface displays for controlling the auxiliary controlllee electronic device, comprises providing~~receiving~~ by the remote control, from the primary controlllee
electronic device, a second collection of user interface displays having a plurality of display states and associated display state transition rules.

46. (Currently Amended) The method of claim 44, wherein said providing~~receiving~~
by the remote control, from a primary controlllee electronic device, of a second collection of user interface displays for controlling the auxiliary controlllee electronic device, comprises providing~~receiving~~ by the remote control, from the primary controlllee
electronic device, a second collection of user interface displays having a plurality of display cells.

47. (Cancelled)

48. (Cancelled)

49. (Cancelled)

50. (Currently Amended) The method of claim 49, wherein said second control commands comprise control commands for controlling a plurality of operation characteristics of said auxiliary controlllee electronic device, and said plurality of operation characteristics ~~comprise~~are selected from a group consisting of power on/off, play, fast forward, reverse, pause, stop, audio volume, picture brightness, and picture color.

51. (Cancelled)

52. (Cancelled)

53. (Currently Amended) A controlle controllee electronic apparatus comprising:
first means to provide to a remote control, from the controllee electronic
apparatus, with a first collection of user interface displays having associated control
commands, for controlling the controllee electronic apparatus, and to receive into the
controllee apparatus, first control commands, from said remote control, the first control
commands being resulteding from said provided first collection of user interface displays
being used by a user of said remote control; and
second means to control operation of said controllee electronic apparatus in
accordance with said received first control commands.

54. (Cancelled)

55. (Cancelled)

56. (Currently Amended) The apparatus of claim 53, wherein the apparatus further
comprises a connection interface adapted to provide a connection selected from a
group consisting of a wireless optical connection operated in accordance with a wireless
optical communication protocol, a wireless electro-magnetic connection operated in
accordance with a wireless communication protocol, and a wired electrical connection
operated in accordance with a wired communication protocol, and said first means is
adapted to provides to the remote control, from the controllee electronic apparatus, with
the first collection of user interface displays through the connection a selected from the
group one of a wireless optical connection in accordance with a wireless optical
communication protocol, a wireless eletro-magnetic connection in accordance with a
wireless communication protocol, and a wired electrical connection in accordance with a
wired communication protocol.

57. (Currently Amended) The apparatus of claim 56, wherein the apparatus further comprises a connection interface adapted to provide an infrared based optical connection, operated in accordance with an IrDA standard based wireless optical communication protocol, and said first means is adapted to provides to the remote control, from the controlllee electronic apparatus, with the first collection of user interface displays through an the infrared based optical connection, using an IrDA standard based wireless optical communication protocol.

58. (Currently Amended) The apparatus of claim 56, wherein the apparatus further comprises a connection interface adapted to provide a wireless electro-magnetic communication connection, operated in accordance with a selected one of a Bluetooth and an IEEE 802.11 standard based wireless communication protocol, and said first means is adapted to provides to the remote control, from the controlllee electronic apparatus, with the first collection of user interface displays through thea wireless electro-magnetic electro-magnetic communication connection, using a selected one of a Bluetooth and an IEEE 802.11 standard based wireless communication protocol.

59. (Currently Amended) The apparatus of claim 56, wherein the apparatus further comprises a connection interface adapted to provide a wired electrical connection selected from a group consisting of a serial connection, a parallel connection, a USB connection, and a IEEE 1394 based connection, operated using a message based communication protocol, and said first means is adapted to provides to the remote control, from the controlllee electronic apparatus, with the first collection of user interface displays through thea wired electrical connection that is a selected one of a serial connection, a parallel connection, a USB connection, and a IEEE 1394 based connection, using a message based communication protocol.

60. (Cancelled)

61. (Cancelled)

62. (Currently Amended) The apparatus of claim 53, wherein said first means is further adapted to provide to said remote control, from the controllee electronic apparatus, with a second collection of user interface displays having associated commands, for controlling an auxiliary controllee electronic device coupled to said controllee electronic apparatus.

63. (Cancelled)

64. (Cancelled)

65. (Cancelled)

66. (Currently Amended) The apparatus of claim 62, further comprising third means to receive into the controllee electronic apparatus, from said auxiliary controllee electronic device, specifications of the substantive contents of said second collection of user interface displays; and
fourth means to generate within the controllee electronic apparatus, said second collection of user interface displays in accordance with said received specifications.

67. (Cancelled)

68. (Currently Amended) The apparatus of claim 66, wherein the apparatus further comprises a connection interface adapted to provide a connection selected from a group consisting of a wireless optical connection operated in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection operated in accordance with a wireless communication protocol, and a wired electrical connection operated in accordance with a wired communication protocol, and said third means is adapted to receive the specifications, into the controllee electronic apparatus, from the auxiliary controllee electronic device, through the connection, a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless

~~communication protocol, and a wired electrical connection in accordance with a wired communication protocol.~~

69. (Currently Amended) The apparatus of claim 68, wherein the apparatus further comprises a connection interface adapted to provide a video connection, operated in accordance with a message based communication protocol embedded within a video protocol, and said third means is adapted to receives the specifications, into the controllee electronic apparatus, from the auxiliary controllee electronic device, through the video connection, using a message-based communication protocol embedded within a video protocol.

70. (Currently Amended) The apparatus of claim 62, wherein
said first means is further adapted to receives second control commands, into the controllee electronic apparatus, from said remote control, the second control commands being resulteding from said provided second collection of user interface displays being used by said user of said remote control; and
said second and third means are further adapted to cooperate to control operation of said auxiliary controllee electronic device in accordance with said received second control commands.

71. (Cancelled)

72. (Currently Amended) The apparatus of claim 70, wherein said second and third means are adapted to cooperate to relay from the controllee electronic apparatus, the received second commands, to the auxiliary controllee electronic device.

73. (Cancelled)

74. (Currently Amended) The apparatus of claim 62, wherein said auxiliary controllee electronic device is a device selected from a group consisting of a

videocassette recorder (VCR), a digital versatile disk (DVD) player, a home theatre audio control unit, and a video camera.

75. (Cancelled)

76. (Original) The apparatus of claim 53, wherein said controllee electronic apparatus is a TV.

77. (Currently Amended) The apparatus of claim 53, wherein said controllee electronic apparatus is a device selected from a group consisting of a set top box, a DVD player, a VCR-.

78. (Currently Amended) An auxiliary controllee electronic apparatus comprising:
first means adapted to provide from the auxiliary controllee electronic apparatus, specifications for a collection of user interface displays having associated control commands, for controlling the auxiliary controllee electronic device, to a primary controlllee electronic device, for the primary controlllee electronic device to generate and provide to a remote control, the collection of user interface displays, to a remote control, from the primary controlllee electronic device;

second means adapted to receive control commands originated from said remote control, into the auxiliary controlllee electronic apparatus, the control commands being resulteding from said provided collection of user interface displays being used by a user of said remote control; and

third means adapted to control operation of said auxiliary controlllee electronic device in accordance with said received control commands.

79. (Cancelled)

80. (Cancelled)

81. (Cancelled)

82. (Currently Amended) The apparatus of claim 78, wherein the apparatus further comprises a connection interface adapted to provide a connection selected from a group consisting of a wireless optical connection operated in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection operated in accordance with a wireless communication protocol, and a wired electrical connection operated in accordance with a wired communication protocol, and said first means is adapted to provides from the auxiliary controllor electronic apparatus, the specifications of its collection of user interface displays, to the primary controllor electronic device, through the connection. ~~a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless communication protocol, a wired electrical connection in accordance with a wired communication protocol.~~

83. (Currently Amended) The apparatus of claim 78, wherein the apparatus further comprises a connection interface adapted to provide a video connection, operated in accordance with a message based communication protocol embedded within a video protocol, and said first means is adapted to provides from the auxiliary controllor electronic apparatus, the specifications for its collection of user interface displays, to the primary controllor electronic device, through thea video connection, using a message based communication protocol embedded within a video protocol.

84. (Currently Amended) The apparatus of claim 78, wherein said second means is adapted to receives into the auxiliary controllor electronic apparatus, the control commands, directly from the remote control through a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless communication protocol, and a wired electrical connection in accordance with a wired communication protocol.

85. (Currently Amended) The apparatus of claim 78, wherein said second means is adapted to receives into the auxiliary controllor electronic apparatus, the control

commands, indirectly via said primary controllor electronic device ~~through a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless communication protocol, and a wired electrical connection in accordance with a wired communication protocol.~~

86. (Currently Amended) The apparatus of claim 78, wherein said auxiliary controllor electronic apparatus is an apparatus selected from a group consisting ~~one~~ of a videocassette recorder (VCR), a digital versatile disk (DVD) player, a home theatre audio control unit, and a video camera.

87. (Cancelled)

88. (Original) The apparatus of claim 78, wherein said primary controllor electronic device is a TV.

89 (Currently Amended) The apparatus of claim 78, wherein said primary controllor electronic device is a device selected from a group consisting ~~one~~ of a set top box, a DVD player and VCR player.

90. (Currently Amended) A field extendable remote control apparatus comprising:
first means adapted to receive into the field extendable remote control apparatus, from a primary controllor electronic device, a first collection of user interface displays having associated control commands, for controlling the primary controllor electronic device;
second means adapted to facilitate usage of the first collection of user interface displays by a user to control the primary controllor electronic device; and
third means adapted to provide first control commands from the field extendible remote control apparatus, to the primary controllor electronic device, to control the primary controllor electronic device, in response to said usage of the first collection of user interface displays.

91. (Cancelled)

92. (Cancelled)

93. (Currently Amended) The apparatus of claim 90, wherein the apparatus further comprises a connection interface adapted to provide a connection selection from a group consisting of a wireless optical connection operated in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection operated in accordance with a wireless communication protocol, and a wired electrical connection operated in accordance with a wired communication protocol, and said first means is adapted to receives into the apparatus, the first collection of user interface displays, from the primary controllor electronic device, through the connection, a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless communication protocol, a wired electrical connection in accordance with a wired communication protocol.

94. (Cancelled)

95. (Cancelled)

96. (Currently Amended) The apparatus of claim 90, wherein
said first means is further adapted to receives into the field extendible remote control apparatus, a second collection of user interface displays having associated control commands, from the primary controllor electronic device, for controlling an auxiliary controllor electronic device coupled to the primary controllor electronic device;
said second means is further adapted to facilitates usage of the second collection of user interface displays by a user to remotely control the auxiliary controllor electronic device; and

said third means is further adapted to provides from the field extendible remote control apparatus, second control commands, either directly or indirectly to the auxiliary controllee electronic device, to control the auxiliary controllee electronic device, in response to said usage of the second collection of user interface displays.

97. (Cancelled)

98. (Cancelled)

99. (Currently Amended) The apparatus of claim 96, wherein the apparatus further comprises a connection interface adapted to provide a connection selection from a group consisting of a wireless optical connection operated in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection operated in accordance with a wireless communication protocol, and a wired electrical connection operated in accordance with a wired communication protocol, and said first means is adapted to receives into said field extendible remote control apparatus, said second collection of user interface displays, from the primary controllee electronic device, through the connection. ~~a selected one of a wireless optical connection in accordance with a wireless optical communication protocol, a wireless electro-magnetic connection in accordance with a wireless communication protocol, a wired electrical connection in accordance with a wired communication protocol.~~

100. (Cancelled)

101. (Cancelled)

102. (Cancelled)

103. (Cancelled)

104. (Cancelled)